Volume 40, 1998

PLASMID

A journal of molecular genetics with emphasis on plasmid biology

Editor-in-Chief
Francis L. Macrina

ACADEMIC PRESS

Copyright © 1998 by Academic Press

All rights reserved

No part of this publication may be reproduced or transmitted in any form or by any means, electronic or mechanical, including photocopy, recording, or any information storage and retrieval system, without permission in writing from the Publisher. *Exceptions:* It is the policy of Academic Press that authors need not obtain permission in the following cases only: (1) to use their original figures or tables in their future works; (2) to make copies of their papers for use in their classroom teaching; and (3) to include their papers as part of their dissertations.

The appearance of the code at the bottom of the first page of an article in this journal indicates the Publisher's consent that copies of the article may be made for personal or internal use, or for the personal or internal use of specific clients. This consent is given on the condition, however, that the copier pay the stated per copy fee through the Copyright Clearance Center, Inc. (222 Rosewood Drive, Danvers, Massachusetts 01923), for copying beyond that permitted by Sections 107 or 108 of the U. S. Copyright Law. This consent does not extend to other kinds of copying, such as copying for general distribution, for advertising or promotional purposes, for creating new collective works, or for resale. Copy fees for pre-1998 articles are as shown on the article title pages; if no fee code appears on the title page, the copy fee is the same as for current articles.

0147-619X/98 $25.00

MADE IN THE UNITED STATES OF AMERICA

This journal is printed on acid-free paper.

Contents of Volume 40

Number 1, July 1998

MEETING REVIEW

Saleem A. Khan and Dhruba K. Chattoraj. Initiation of DNA Replication in Phages and Plasmids—A Workshop Summary 1

REVIEW

C. J. Smith, G. D. Tribble, and D. P. Bayley. Genetic Elements of *Bacteroides* Species: A Moving Story 12

REGULAR ARTICLES

Lars Andrup, Lasse Smidt, Katja Andersen, and Lars Boe. Kinetics of Conjugative Transfer: A Study of the Plasmid pXO16 from *Bacillus thuringiensis* subsp. *israelensis* 30

Florence Bourgoin, Gérard Guédon, Brigitte Gintz, and Bernard Decaris. Characterization of a Novel Insertion Sequence, IS*1194,* in *Streptococcus thermophilus* 44

Clifford N. Dominy, Nicolette J. Coram, and Douglas E. Rawlings. Sequence Analysis of Plasmid pTF5, a 19.8-kb Geographically Widespread Member of the *Thiobacillus ferrooxidans* pTFI91-like Plasmid Family 50

H. Banerjee, C. Kopvak, and D. Curley. Identification of Linear DNA Plasmids of the Yeast *Pichia pastoris* 58

G. A. Somkuti, D. K. Y. Solaiman, and D. H. Steinberg. Structural and Functional Properties of the *hsp16.4*-Bearing Plasmid pER341 in *Streptococcus thermophilus* ... 61

Elena I. Katzy, Larisa Yu. Matora, Oksana B. Serebrennikova, and Andrew V. Scheludko. Involvement of a 120-MDa Plasmid of *Azospirillum brasilense* Sp245 in the Production of Lipopolysaccharides 73

SHORT COMMUNICATION

Silvia A. Ciafrè, Monica Rinaldi, Isabella Vespignani, Paola Parrella, Davide Seripa, Emanuela Signori, Francesco Ria, Maria Giulia Farace, and Vito M. Fazio. A Plasmid Family Containing Two Different Expression Cassettes Suitable for Immunomodulation and Genetic Immunization 84

Number 2, September 1998

Ole Skovgaard, Kirsten Olesen, and Andrew Wright. The Central Lysine in the P-Loop Motif of the *Escherichia coli* DnaA Protein Is Essential for Initiating DNA Replication from the Chromosomal Origin, *oriC,* and the F Factor Origin, *oriS,* but Is Dispensable for Initiation from the P1 Plasmid Origin, *oriR* 91

Jen-Fen Fu, Jer-Ming Hu, Yu-Sun Chang, and Shih-Tung Liu. Isolation and Characterization of Plasmid pSW200 from *Erwinia stewartii* 100

Anna Herman-Antosiewicz, Sylwia Śrutkowska, Karol Taylor, and Grzegorz Węgrzyn. Replication and Maintenance of λ Plasmids Devoid of the Cro Repressor Autoregulatory Loop in *Escherichia coli* 113

Andreas Tauch, Zhaoxin Zheng, Alfred Pühler, and Jörn Kalinowski. *Corynebacterium striatum* Chloramphenicol Resistance Transposon Tn*5564:* Genetic Organization and Transposition in *Corynebacterium glutamicum* 126

Yong Fang Li, Tetsuya Hayashi, and Yoshiro Terawaki. Functional Domains of Rts1 and P1 RepA Proteins for Initiation of Replication 140

Elżbieta Hiszczyńska-Sawicka and Józef Kur. Effect of Integration Host Factor on RNA II Synthesis in Replication of Plasmid Containing *ori*p15A 150

SHORT COMMUNICATIONS

Xianghong Zou, X. L. Feng, W. X. Chen, and F. D. Li. Biological Behavior of Plasmid in *Rhizobium* sp. Strain S25 from *Tephrosia candida* 158

David R. Sage, Antoinette C. Chillemi, and Joyce D. Fingeroth. A Versatile Prokaryotic Cloning Vector with Six Dual Restriction Enzyme Sites in the Polylinker Facilitates Efficient Subcloning into Vectors with Unique Cloning Sites 164

Catherine J. Pujol and Clarence I. Kado. Characterization of pUCD5000 Involved in Pink Disease Color Formation by *Pantoea citrea* 169

Number 3, November 1998

David M. Stevenson, Muthusamy Kunnimalaiyaan, Kerstin Müller, and Patricia S. Vary. Characterization of a Theta Plasmid Replicon with Homology to All Four Large Plasmids of *Bacillus megaterium* QM B1551 175

David Prangishvili, Sonja-Verena Albers, Ingelore Holz, Hans Peter Arnold, Kenneth Stedman, Tino Klein, Harpreet Singh, Jan Hiort, Anja Schweier, Jakob K. Kristjansson, and Wolfram Zillig. Conjugation in Archaea: Frequent Occurrence of Conjugative Plasmids in *Sulfolobus* 190

Chew Chieng Yeo, Jill Maelan Tham, Stephen Matthew Kwong, and Chit Laa Poh. Characterization of the *Pac*25I Restriction-Modification Genes Isolated from the Endogenous pRA2 Plasmid of *Pseudomonas alcaligenes* NCIB 9867 203

Paloma Acebo, Ana M. Hernández-Arriaga, M. Gabriela Kramer, Manuel Espinosa, and Gloria del Solar. Identification of a New Gene in the Streptococcal Plasmid pLS1: The *rnaI* Gene 214

SHORT COMMUNICATIONS

Keith E. Weaver, Kristi D. Walz, and Mark S. Heine. Isolation of a Derivative of *Escherichia coli–Enterococcus faecalis* Shuttle Vector pAM401 Temperature Sensitive for Maintenance in *E. faecalis* and Its Use in Evaluating the Mechanism of pAD1 *par*-Dependent Plasmid Stabilization 225

Marite Bradshaw, Michael C. Goodnough, and Eric A. Johnson. Conjugative Transfer of the *Escherichia coli–Clostridium perfringens* Shuttle Vector pJIR1457 to *Clostridium botulinum* Type A Strains 233

Sylvie Aubert, Keith G. H. Dyke, and Nevine El Solh. Analysis of Two *Staphylococcus epidermidis* Plasmids Coding for Resistance to Streptogramin A 238

Michael Larsen, Norio Gunge, and Friedhelm Meinhardt. *Kluyveromyces lactis* Killer Plasmid pGKL2: Evidence for a Viral-like Capping Enzyme Encoded by ORF3 243

R. C. Faustoferri, R. G. Quivey, Jr., A. J. Smith, and R. Sanchez. A Medium-Copy-Number Plasmid for Insertional Mutagenesis of *Streptococcus mutans* 247

Author Index for Volume 40 252